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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/652,513	08/31/2000	Leon L. Shaw	97-1681-P	4468

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EXAMINER

HENDRICKSON, STUART L

ART UNIT	PAPER NUMBER
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1754

DATE MAILED: 09/04/2003

do

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

652513

Applicant(s)

Shaw

Examiner

Henderson

Group Art Unit

1189

—The MAILING DATE of this communication appears on the cover sheet beneath the correspondence address—

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, such period shall, by default, expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- ☒ Responsive to communication(s) filed on 7/3/03
- ☐ This action is **FINAL**.
- ☐ Since this application is in condition for allowance except for formal matters, **prosecution as to the merits is closed** in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

Disposition of Claims

- ☒ Claim(s) 1-27 is/are pending in the application.
- ☐ Of the above claim(s) _____ is/are withdrawn from consideration.
- ☐ Claim(s) _____ is/are allowed.
- ☒ Claim(s) 1-14, 16-21, 23-27 is/are rejected.
- ☒ Claim(s) 15, 22 is/are objected to.
- ☐ Claim(s) _____ are subject to restriction or election requirement

Application Papers

- ☐ The proposed drawing correction, filed on _____ is ☐ approved ☐ disapproved.
- ☐ The drawing(s) filed on _____ is/are objected to by the Examiner
- ☐ The specification is objected to by the Examiner.
- ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119 (a)-(d)

- ☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119 (a)-(d).
- ☐ All ☐ Some* ☐ None of the:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____
 - ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a))

*Certified copies not received: _____

Attachment(s)

- ☐ Information Disclosure Statement(s), PTO-1449, Paper No(s). _____
- ☒ Notice of Reference(s) Cited, PTO-892
- ☐ Notice of Draftsperson's Patent Drawing Review, PTO-948
- ☐ Interview Summary, PTO-413
- ☐ Notice of Informal Patent Application, PTO-152
- ☐ Other _____

Office Action Summary

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The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claims 23-27 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

A) In claims 23 and 27, 'source' appears intended for 'precursor'.

Claims 1, 2 and 4-7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Lee et al. taken with Crawford et al.

This is the same rejection in paper 18, incorporated herein by reference.

Claims 3 and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Lee et al. taken with Crawford et al. as applied to claims 1, 2 and 4-7 above, and further in view of Kurachi.

The above does not teach the carbon sources, but Kurachi does in column 5. Using them in the process of Lee is an obvious expedient to provide the carbon source required by Lee.

Claims 1-5, 7-14, 16-21 and 23-26 are rejected under 35 U.S.C. 102(e) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Dunmead et al. '803.

This is the same rejection in paper 18, incorporated herein by reference.

Claims 1, 2, 4, 8-10 and 14 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over El-Eskandarany et al.

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The reference teaches on pg. 4210 high energy milling carbon, W oxide and an extra metal, then leaching/washing then annealing. No differences are seen in the product made. Claim 9 is met in that the W oxide is a precursor to WC recited in the claim. No differences are seen.

Claims 1-5, 7-14, 16-21^{13,14,15} are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Volin et al. 3865586.

Volin teaches in ex. 4 and 5 in particular grinding carbon and various metal powders at 350 rpm, then sintering in Ar. While not teaching a 'cermet' which is 'nanostructured', no difference is seen since the materials and conditions appear to be the same as in the present disclosure.

Applicant's arguments filed 7/3/03 have been fully considered but they are not persuasive. The argument that the references do not teach 'high' energy is not persuasive, as limitations in the specification are not imported into the claims. As the claims only require one metal with carbon, they encompass making carbides. The arguments imply that a cermet contains at least two metals; if so, the claims should reflect this. The claims do not require at least 300 rpm milling. The El-Eskandarany removes the Co does not detract from the fact that when it was present, the 'cermet' existed.

Any inquiry concerning this communication should be directed to examiner Hendrickson at telephone number (703) 308-2539.



Stuart Hendrickson
examiner Art Unit 1754